

Listing of the Claims:

1 – 27 (Canceled).

28. (Withdrawn) A blood pumping system, for perfusing a distal region of a patient's circulatory system, comprising: a blood pressure altering device, wherein said blood pressure altering device is in fluid communication with said circulatory system, and wherein said blood pressure altering device pumps blood so as to create a localised hypertensive region in said distal region.

29. (Withdrawn) The system as claimed in claim 28, wherein said blood pressure altering device is located in a position remote from the heart of the patient.

30. (Withdrawn) The system as claimed in claim 28, wherein said distal region includes a portion of the arterial blood supply of the circulatory system.

31. (Withdrawn) The system as claimed in claim 28, wherein said system supplies a continuous supra- systolic pressure in both systole and diastole.

32. (Withdrawn) The blood pumping system as claimed in claim 28, wherein said blood pressure altering device is positioned in series with the normal blood flow of a circulatory system.

33. (Withdrawn) The blood pumping system as claimed in claim 28, wherein said localised hypertensive region is created downstream from the blood pressure altering device.

34. (Withdrawn) The blood pumping system as claimed in claim 28, wherein the blood pressure altering device is a pump.

35. (Withdrawn) The blood pumping system as claimed in claim 28, wherein said system provides a means of vascular regeneration.
36. (Withdrawn) The blood pumping system as claimed in claim 28, wherein said blood pumping system includes a flow resistor.
37. (Withdrawn) The blood pumping system as claimed in claim 28, wherein said blood pressure altering device is implantable within the body of a patient.
38. (Withdrawn) The blood pumping system as claimed in claim 28, wherein said blood pressure altering device has a relatively flat flow pressure curve characteristic.
39. (New) A blood pumping system, for perfusing a distal region of a patient's circulatory system, comprising: a blood pressure altering device, wherein said blood pressure altering device is in fluid communication with said circulatory system, and wherein said blood pressure altering device pumps blood so as to create a localized hypertensive region in said distal region.
40. (New) The system as claimed in claim 39, wherein said blood pressure altering device is located in a position remote from the heart of the patient.
41. (New) The system as claimed in claim 39, wherein said distal region includes a portion of the arterial blood supply of the circulatory system.

42. (New) The system as claimed in claim 39, wherein said system supplies a continuous supra-systolic pressure in both systole and diastole.
43. (New) The blood pumping system as claimed in claim 39, wherein said blood pressure altering device is positioned in series with the normal blood flow of a circulatory system.
44. (New) The blood pumping system as claimed in claim 39, wherein said localized hypertensive region is created downstream from the blood pressure altering device.
45. (New) The blood pumping system as claimed in claim 39, wherein the blood pressure altering device is a blood pump.
46. (New) The blood pumping system as claimed in claim 39, wherein said blood pumping system includes a flow resistor.
47. (New) The blood pumping system as claimed in claim 39, wherein said blood pressure altering device is implantable within the body of a patient.
48. (New) The blood pumping system as claimed in claim 39, wherein said blood pressure altering device has a relatively flat flow pressure curve characteristic.

49. (New) The blood pumping system as claimed in claim 39, configured for perfusing at least one said distal regions of a patient.

50. (New) The blood pumping system as claimed in claim 49, wherein the at least one distal region includes one or more of any one limb, a brain region or a pelvic region of a patient.

51. (New) The blood pumping system as claimed in claim 45 wherein the blood pump comprises an inlet and an outlet for connection to the circulatory system of a patient.

52. (New) The system of claim 51 wherein the inlet is connected to an arterial system of the patient.

53. (New) The system of claim 52 wherein the outlet is connected to an arterial system of the patient.

54. (New) The system of claim 51 wherein the inlet or outlet includes cannulae extensions to allow variable positioning of the blood pump.

55. (New) The system as in claim 46 wherein said flow resistor is regulated externally.

56. (New) The system as in claim 45 wherein said blood pump is implantable and the system includes an implantable power source and implantable controller both to cooperate with said blood pump.

57. (New) The system as in claim 49 wherein said blood pressure altering device includes at least one additional outlet for connection to a haemodialysis system.